ENTOMOLOGY, B.S.

REQUIREMENTS

UNIVERSITY GENERAL EDUCATION REQUIREMENTS

All undergraduate students at the University of Wisconsin–Madison are required to fulfill a minimum set of common university general education requirements to ensure that every graduate acquires the essential core of an undergraduate education. This core establishes a foundation for living a productive life, being a citizen of the world, appreciating aesthetic values, and engaging in lifelong learning in a continually changing world. Various schools and colleges will have requirements in addition to the requirements listed below. Consult your advisor for assistance, as needed. For additional information, see the university Undergraduate General Education Requirements (http://guide.wisc.edu/undergraduate/#requirementsforundergraduatestudytext) section of the *Guide*.

General Education

- Breadth—Humanities/Literature/Arts: 6 credits
- Breadth—Natural Science: 4 to 6 credits, consisting of one 4- or 5-credit course with a laboratory component; or two courses providing a total of 6 credits
- Breadth—Social Studies: 3 credits
- Communication Part A & Part B *
- Ethnic Studies *
- Quantitative Reasoning Part A & Part B *

* The mortarboard symbol appears before the title of any course that fulfills one of the Communication Part A or Part B, Ethnic Studies, or Quantitative Reasoning Part A or Part B requirements.

COLLEGE OF AGRICULTURAL AND LIFE SCIENCES REQUIREMENTS

In addition to the University General Education Requirements, all undergraduate students in CALS must satisfy a set of college and major requirements. Courses may not double count within university requirements (General Education and Breadth) or within college requirements (First-Year Seminar, International Studies, Science, and Capstone), but courses counted toward university requirements may also be used to satisfy a college and/or a major requirement; similarly, courses counted toward college requirements may also be used to satisfy a university and/or a major requirement.

COLLEGE REQUIREMENTS FOR ALL CALS B.S. DEGREE PROGRAMS

Code	Title	Credits
Quality of Work: Students must maintain a minimum cumulative grade point average of 2.000 to remain in good standing and be eligible for graduation.		
Residency: Students must complete 30 degree credits in residence at UW–Madison after earning 86 credits toward their undergraduate degree.		
First Year Seminar (http://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSFirstYearSeminarCourses)		1
International Studies (http://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSInternationalStudiesCourses)		3
Physical Science Fundamentals		4-5
CHEM 103	General Chemistry I	
or CHEM 108	Chemistry in Our World	
or CHEM 109	Advanced General Chemistry	
Biological Science		5
Additional Science (Biological, Physical, or Natural)		3
Science Breadth (Biological, Physical, Natural, or Social)		3
CALS Capstone Learning Experience: included in the requirements for each CALS major (see "Major Requirements") (http://guide.wisc.edu/undergraduate/agricultural-life-sciences/#CALSCapstoneRequirement)		

MAJOR REQUIREMENTS

Code	Title	Credits
Mathematics		
Select one of the following (or placement exam):		5-6
MATH 112 & MATH 113	Algebra and Trigonometry	
MATH 114	Algebra and Trigonometry	
MATH 171	Calculus with Algebra and Trigonometry I [1]	
Select one of the following:		5
MATH 211	Calculus	
MATH 217	Calculus with Algebra and Trigonometry II	
MATH 221	Calculus and Analytic Geometry 1	
STAT 371	Introductory Applied Statistics for the Life Sciences	
Chemistry		
Select one of the following:		5-9
CHEM 103 & CHEM 104	General Chemistry I and General Chemistry II	
CHEM 109	Advanced General Chemistry	
Biology		
Option 1:		
BIOLOGY/BOTANY/ZOOLOGY 151 & BIOLOGY/BOTANY/ZOOLOGY 152	Introductory Biology and Introductory Biology	
Option 2:		
ZOOLOGY/BIOLOGY 101 & ZOOLOGY/BIOLOGY 102 & BOTANY/BIOLOGY 130	Animal Biology and Animal Biology Laboratory and General Botany	
Option 3:		

BIOCORE 381 & BIOCORE 382 & BIOCORE 383 & BIOCORE 384	Evolution, Ecology, and Genetics and Evolution, Ecology, and Genetics Laboratory and Cellular Biology and Cellular Biology Laboratory	
Select 12 additional credits from any biological or physical science course (at least 8 credits must be 300-level or 200-level courses with the intermediate-level designation). [2]		
Physics		
Select one of the following:		3-5
PHYSICS 103	General Physics	
PHYSICS 107	The Ideas of Modern Physics	
PHYSICS 109	Physics in the Arts	
PHYSICS 115	Energy and Climate	
PHYSICS 201	General Physics	
PHYSICS 207	General Physics	
Entomology Core		
ENTOM/ZOOLOGY 302	Introduction to Entomology	4
Select 11 credits as follows:		11
Must select at least 3 credits from at least two subsets (organismal, suborganismal, or applied)		
May select up to 3 credits from subset called "other"		
Capstone		
ENTOM 468	Studies in Field Entomology [3]	3
Total Credits		**36-43**

1

If MATH 171 is taken, student must take MATH 217.

2

Suggested courses/subjects include GENETICS 466, CHEM 341, CHEM 342 CHEM 343, CHEM 344, CHEM 345, PHYSICS 104, PHYSICS 202, PHYSICS 208, ENTOM not used elsewhere, BOTANY, ZOOLOGY, F&W ECOL, MICRO, PL PATH.

3

ENTOM 468, taken after the junior year, is the recommended capstone course (can double count in Core Courses). ENTOM 681 Senior Honors Thesis, ENTOM 682 Senior Honors Thesis, ENTOM 691 Senior Thesis, ENTOM 699 Special Problems can be substituted in special circumstances (and can double count up to 3 credits in Core Category); see advisor.

SUBSET COURSES

ORGANISMAL

Code	Title	Credits
ENTOM 331	Taxonomy of Mature Insects	4
ENTOM 432	Taxonomy and Bionomics of Immature Insects	4
ENTOM 450	Basic and Applied Insect Ecology [1]	3
ENTOM 451	Basic and Applied Insect Ecology Laboratory (requires enrollment in ENTOM 450) [1]	1
ENTOM 468	Studies in Field Entomology	3
ENTOM/BOTANY/ ZOOLOGY 473	Plant-Insect Interactions	3
The following three courses:		3
ENTOM/ AGRONOMY/ F&W ECOL/ M&ENVTOX 632	Ecotoxicology: The Chemical Players	
ENTOM/ AGRONOMY/ F&W ECOL/ M&ENVTOX 633	Ecotoxicology: Impacts on Individuals	
ENTOM/ AGRONOMY/ F&W ECOL/ M&ENVTOX 634	Ecotoxicology: Impacts on Populations, Communities and Ecosystems	
ENTOM 701	Advanced Taxonomy	3

1

ENTOM 450 Basic and Applied Insect Ecology and ENTOM 451 Basic and Applied Insect Ecology Laboratory can count toward either the organismal or applied categories, not both

SUBORGANISMAL

Code	Title	Credits
ENTOM 321	Physiology of Insects	3
ENTOM/BOTANY/ PL PATH 505	Plant-Microbe Interactions: Molecular and Ecological Aspects	3
ENTOM/GENETICS/ ZOOLOGY 624	Molecular Ecology	3

APPLIED

Code	Title	Credits
ENTOM/M M & I/ PATH-BIO/ ZOOLOGY 350	Parasitology	3
ENTOM 351	Principles of Economic Entomology	3
ENTOM/ ZOOLOGY 371	Medical Entomology	3
ENTOM 450	Basic and Applied Insect Ecology [1]	3
ENTOM 451	Basic and Applied Insect Ecology Laboratory [1]	1
ENTOM/ F&W ECOL 500	Insects in Forest Ecosystem Function and Management	2

1

ENTOM 450 Basic and Applied Insect Ecology and ENTOM 451 Basic and Applied Insect Ecology Laboratory can count toward either the organismal or applied categories, not both

OTHER

Code	Title	Credits
ENTOM 375	Special Topics	1-4
ENTOM 399	Coordinative Internship/ Cooperative Education	1-8
ENTOM 681	Senior Honors Thesis	2-4
ENTOM 682	Senior Honors Thesis	2-4
ENTOM 691	Senior Thesis	2
ENTOM 699	Special Problems	1-4

UNIVERSITY DEGREE REQUIREMENTS

Total Degree	To receive a bachelor's degree from UW–Madison, students must earn a minimum of 120 degree credits. The requirements for some programs may exceed 120 degree credits. Students should consult with their college or department advisor for information on specific credit requirements.
Residency	Degree candidates are required to earn a minimum of 30 credits in residence at UW–Madison. "In residence" means on the UW–Madison campus with an undergraduate degree classification. “In residence” credit also includes UW–Madison courses offered in distance or online formats and credits earned in UW–Madison Study Abroad/Study Away programs.
Quality of Work	Undergraduate students must maintain the minimum grade point average specified by the school, college, or academic program to remain in good academic standing. Students whose academic performance drops below these minimum thresholds will be placed on academic probation.